

ABSTRACT OF THE DISCLOSURE

A pulse modulator includes a circulator which comprises: two ferrite plates; a plurality of mode suppressors for transmitting therethrough an LSM mode electromagnetic wave while shutting off an LSE mode electromagnetic wave; and an impedance matching member mounted on one end face of each of the mode suppressors, wherein a pulse modulation switch having a Schottky barrier diode is mounted on the other end face of any one of the mode suppressors in such a manner that the direction of application of a bias voltage to the Schottky barrier diode coincides with the direction of electric field of the LSM mode electromagnetic wave, and wherein the distance from an edge of the ferrite plates to the Schottky barrier diode is set approximately equal to $n\lambda/2$. Herein, n is an integer not smaller than 1, and λ is the wavelength of the high frequency signal.